Regional Greenhouse Gas Initiative (RGGI) in Maine

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Overview

- Introduction
- Impacts of Climate Change
- Purpose of RGGI
- What is RGGI
- Affected Sources
- Emissions Reductions

Overview (cont.)

- RGGI Flexibility
- RGGI MOU
- How Will RGGI Work
- Expected Effects of RGGI
- Maine RGGI Process
- Maine Model Rule

Introduction

- Climate Change
  - What we know
  - How it could affect Maine
- State Climate Change Action Plan
  - Legislative goals
  - Action Plan recommendations

Impacts of Climate Change

More Frequent Intense Storms

Impacts of Climate Change (cont.)

Warming Threatens the Maple Tree, Maple Syrup and Fall Foliage

Purpose of RGGI

- Reduce regional greenhouse gas emissions
  - Promote energy efficiency
  - Promote low-carbon resources
  - Establish a carbon price
  - Encourage innovative technologies
- Establish model for a national program

What is RGGI?

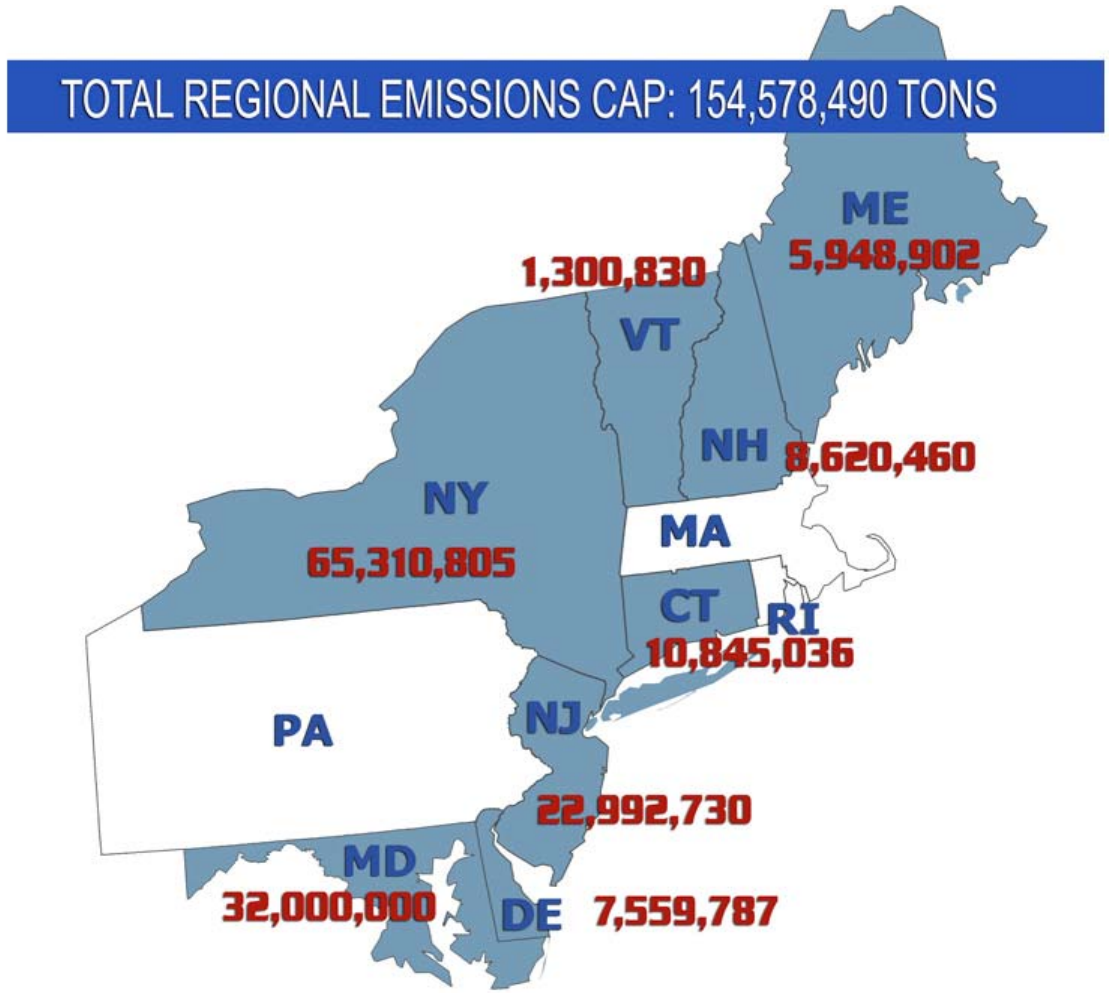
- Regional CO_2 Cap & Trade Program
- Eight States
  - Maine
  - Connecticut
  - Delaware
  - Maryland
  - New Jersey
  - Vermont
  - New York
  - New Hampshire

* Massachusetts excepted to join in 2007

What is RGGI? (CONT.)

- Takes effect in 2009
- Expected 35% CO_2 emissions reduction below business as usual
- Fossil fuel-fired electric power producers
- 25 MW or greater

What is RGGI? (cont.)



What is RGGI? (cont.)

The RGGI region represents:

- 39.4 million people - (13% of US Population)
- 11th largest emitter in the world
- $1.8 trillion economy - (15% of U.S. economy)

What is RGGI? (cont.)

When California links to RGGI it will represent:

- 24% of U.S. Population
- 28% of U.S. Economy
- 3rd Largest World Economy
- 15% of U.S. Emissions
- 6th Largest Emitter Worldwide

Affected Sources

- Maine RGGI Regulated Power Plants:
  - **Calpine - Westbrook**
  - **Casco Bay Energy - Veazie**
  - **Florida Power and Light - Yarmouth**
  - **Rumford Power - Rumford**
  - **Verso Paper – Androscoggin Mill**
  - **Verso Paper - Bucksport Mill**

Emissions Reductions

Regional Emissions Cap

- RGGI CO_2 allocation: 154,578,490
  - Projected CO_2 reductions: 54 million tons

State Emissions Cap

- Maine CO_2 allocation: 5,948,902
  - Projected CO_2 reductions: 2.1 million tons

*Projected CO_2 reduction based on 10% reduction goal and 25% BAU growth

RGGI MOU

- Signed by 8 states
- 25% CO_2 allowances allocated to public benefit
- Optional 5% for new sources
- Regional Organization
- Implementation of Model Rule with limited changes

How Will RGGI Work ?

- States defined who's regulated;
- States set a regional emissions cap;
  - Based on each state's average CO_2 emissions 2000 to 2004
- States agreed on how many tons of CO_2 or how many "allowances" each state will be entitled to;
- States established the reduction goals;
  - 10% reduction from the cap by 2020

How Will RGGI Work ? (cont.)

- Each state will decide how to make allowances available
  - 25 % minimum to public benefit
  - 0% to 75% allocation to RGGI sources
  - 0% to 5% optional new source set aside
- Establish trading rules

How Will RGGI Work ? (cont.)

- Each source tracks its CO_2 emissions
- Each source will require 1 allowance per ton of CO_2 emitted
- Sources can acquire allowances
  - Receive allowances from state
  - Buy allowances
  - Buy offset allowances
  - Use banked or early reduction allowances

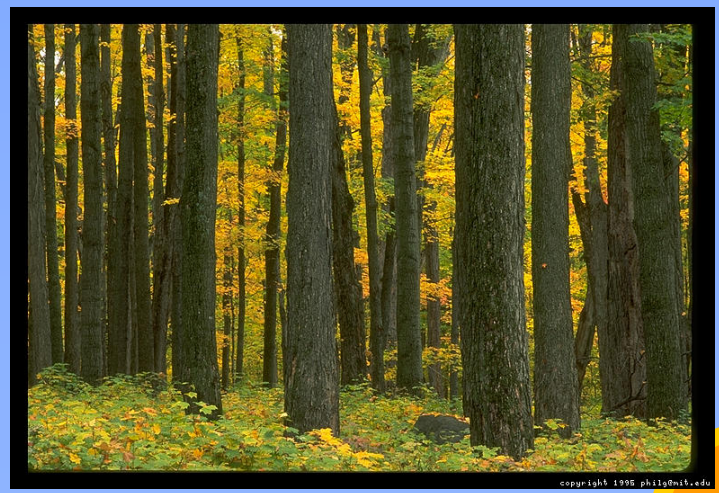
RGGI Flexibility

- Early reduction credits
  - Emissions reduction in 2006, 2007 & 2008
- Banking
  - Allowances held in an account
- Offset Allowances
  - Emission reduction that occur outside of the RGGI regulated units

RGGI Flexibility (cont.)

Methane Capture from Farms

Convert Land to Forest



RGGI Flexibility (cont.)

SF_6 Gas Leak Prevention in Electricity Distribution

Landfill Gas Capture at Small Landfills

RGGI Flexibility (cont.)

And End-Use Energy Efficiency Projects

Expected Effects of RGGI

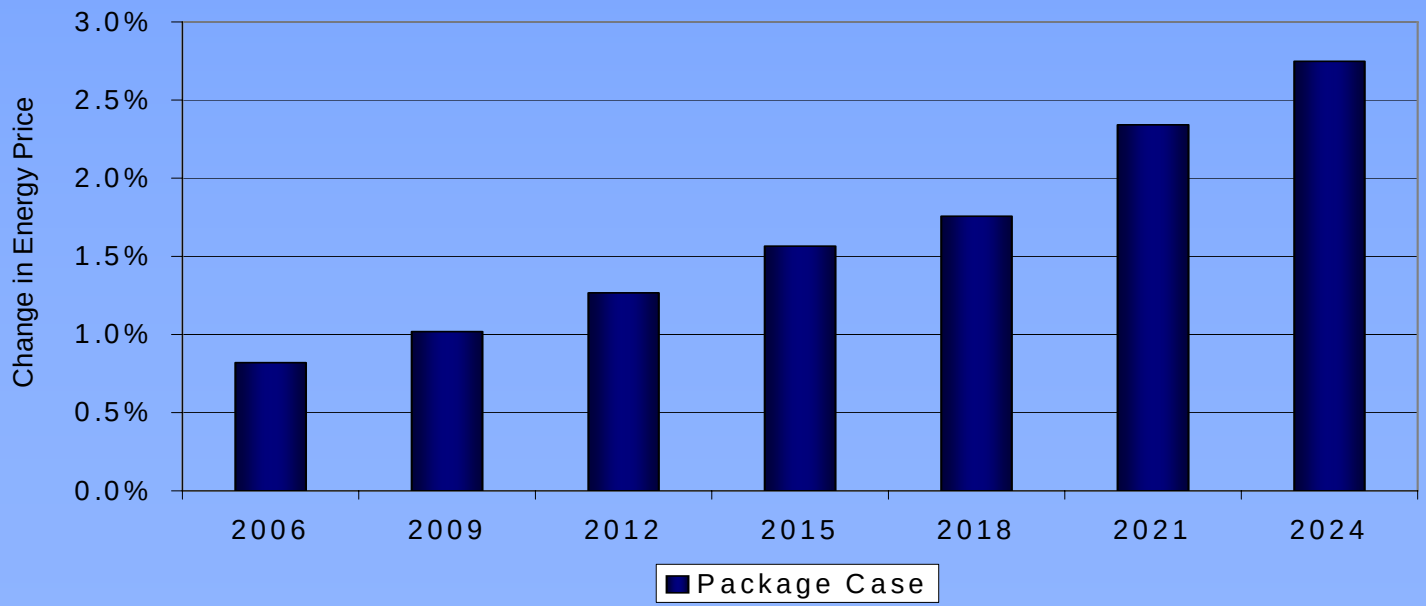
- Start on the path to lowering emissions of CO_2;
- Help reduce our dependence on foreign sources of energy;
- Promote cleaner forms of electric generation;
- Achieve lowest cost reductions of CO_2 emissions;
- Encourage new investment in alternative energy and energy efficiency projects; and

Expected Effects of RGGI (cont.)

- Stimulate the development of new technologies.
- Leakage
  - Use consumer benefit $ to reduce demand
  - Use CO_2 generation performance standard
  - Accepting leakage and impacts associated with it
  - Create a robust and flexible offset market

Expected Effects of RGGI (cont.)

- Energy costs in the RGGI region are expected to increase .8% to 2.75%
- Projected Household Bill will increase $3 - $22 annually
- Increases in Energy Efficiency will mitigate cost or provide a net dollar benefit to energy consumers



Maine RGGI Process

- Legislative authority
- Rulemaking
  - Modify model rule with public input
  - Post to Board of Environmental Protection
  - Hold Public Hearing
  - Revise rule
  - BEP adopts rule

Maine Model Rule

- Seeking input on model rule modifications
  - % CO_2 budget set aside for public benefit
    - 25 % to 100%
  - % CO_2 budget set aside for new sources
    - 0% to 5%
  - Method for allocating allowances
    - Baseline emissions
    - Output based efficiency

Maine Model Rule (cont.)

- Seeking input on model rule
  - Method for establishing emission baselines
  - New offset categories
  - ID other key issues

We need public input!

For this presentation and other related information visit our website
www.maine.gov/dep/air/rggi.htm